REQUIREMENT 1

SAFETY (PERSONNEL HAZARD)

1. Purpose. The purpose of this requirement is to establish objectives in the design, development and production of military electronic equipment to promote maximum safety of both operating and maintenance personnel and equipments during all phases of operational life.

2. Documents applicable to Requirement 1:

MIL-R-9673	Radiation Limits, Microwave and X-Radiation Generated by Ground Electronic Equipment (As Related to Personnel Safety)
MIL-M-19590	Marking of Commodities and Containers to Indicate Radioactive Material
MIL-STD-129	Marking for Shipment and Storage
USAS Z35.1-1959	Industrial Accident Prevention Signs, Specifications for

3. Definitions. The following definitions apply to Requirement 1.

3.1 Chassis, electrical equipment. The chassis is a structural item of electrically conductive material fabricated in such manner as to facilitate assemblage and interconnection of electrical or electronic items for the specific purpose of providing a basis for electrical or electronic circuits. It normally has drilled or stamped holes to accommodate the items but may include only the items necessary for its own mounting and support.

3.2 Frame. The frame is any construction system fitted and united together, designed for mounting or supporting electrical or electronic parts or units.

4. General consideration. The design and development of all military electronic equipment shall provide fail-safe features for safety of personnel during the installation, operation, maintenance, and repair of interchanging of a complete equipment assembly or component parts thereof.

4.1 Additional considerations. Proper instructions in accident prevention and first-aid procedures shall be given all persons engaged in electrical work to fully inform them of the hazards involved.

(a) Current rather than voltage is the most important variable in establishing the criterion for shock intensity. Three factors that determine the severity of electrical shock are: (1) Quantity of current

flowing through the body; (2) path of current through the body, and (3) duration of time that the current flows through the body. The voltage necessary to produce the fatal current is dependent upon the resistance of the body, contact conditions, and the path through the body. (See table 1-I).

TABLE 1-I Probable effects of shock

Current values (milliamperes)		Effects
AC 60 Hz	DC	
0-1	0-4	Preception
1-4	4-15	Surprise
4-21	15-80	Reflex action
21-40	80-160	Muscular inhibition
40-100	160-300	Respiratory block
Over 100	Over 300	Usually fatal

(b) Sufficient current passing through any part of the body will cause severe burns and hemorrhages. However, relatively small currents can be lethal if the path includes a vital part of the body, such as the heart or lungs. Electrical burns are usually of two types, those produced by heat of the arc which occurs when the body touches a high-voltage circuit, and those caused by passage of electrical current through the skin and tissue. There are various methods of incorporating adequate safeguards for personnel, many of these methods being implicit in routine design procedures. However, additional design requirements and relative information pertaining to safety of personnel are outlined and detailed in this military standard.

(c) Human engineering factors affecting safety should also be considered when writing general or detailed equipment specifications.

5. Electrical. The design shall incorporate methods to protect personnel from accidental contact with voltages in excess of 30 volts root mean square or direct current (rms or dc) during normal operation of a complete equipment. Means shall be provided so that power may be cut off while installing, replacing, or interchanging a complete equipment, assembly, or part thereof. Personnel shall be protected from capacitor discharges and when changing fuses or tubes. The main power ON-OFF switch located on the equipment (clearly labeled as such) shall cut off all power to the complete equipment. The power input side of the switch and the incoming power line connections shall be given physical protection against accidental contact. Suitable internal protective measures are defined in table 1-II.

5.1 Ground potential. The design and construction of the equipment shall insure that all external parts, surfaces, and shields, exclusive of antenna and transmission line terminals, are at ground potential at all times during normal operation. The design shall include consideration of ground faults and voltage limits established on a basis of hazardous location. Any external or interconnecting cable, where a ground is part of the circuit, shall carry a ground wire in the cable terminated at both ends in the same manner as the other conductors. In no case, except with coaxial cables, shall the shield be depended upon for a current-carrying ground connection. Antenna and transmission line terminals shall be at ground potential, except for radio frequency (rf) energy on their external surfaces. Plugs and convenience outlets for use with metal cased portable tools and equipment shall have provisions for automatically grounding the metal frame or case of tools and equipment when the plug is mated with the receptacle.

5.2 Grounding. Ground connections to shields, hinges, and other mechanical parts shall not be made to complete electrical circuits. The chassis or frame may serve as the common tie point of the neutral carrying wire. The path to ground from the equipment shall:

(a) Be continuous and permanent.

(b) Have ample carrying capacity to conduct safely any operating or fault currents that may be imposed upon it.

(c) Have impedance sufficiently low to limit the potential above ground and to facilitate the operation of the overcurrent devices in the circuit. Wires installed in long lines (conduit or cables), which are inactive, shall be grounded to allow for stray or static electricity discharge.

(d) Have sufficient mechanical strength of the material to minimize possibility of ground disconnection.

5.3 Grounding to chassis. Ground connection to the chassis or frame shall be mechanically secured by soldering to a spotwelded terminal lug or to a portion of the chassis or frame that has been formed into a soldering lug, or by use of a terminal on the ground wire and then securing the terminal by a screw, nut, and lockwasher. The screw shall fit in a tapped hole in the chassis or frame or it shall be held in a through-hole by a nut. When the chassis or frame is made of steel, the metal around the screw hole shall be plated or tinned to provide a corrosion-resistant connection. If alloys of aluminum or aluminum with a corrosion-resistant surface finish are used, the metal around the screw hole shall not require masking if resistance of less than 0.002 ohm is measured through the coating.

5.4 Shielding. Shielding on wire or cable shall be grounded to the chassis or frame, in the manner specified in 5.3. The shielding shall be

secured to prevent it from contacting exposed current-carrying parts or grounding to the chassis or frame at any point other than the ground termination. The shielding shall end at a sufficient distance from exposed conductors to prevent shorting or arcing between the conductor and the shielding.

5.5 Guards and barriers. All contacts, terminals, and like devices having voltages between 70 and 500 volts rms and dc with respect to ground shall have barriers or guards provided to prevent personnel from accidental contact with such voltages. The barrier or guard shall be marked to indicate the approximate highest voltage (nearest round number) which may be encountered upon removal.

5.6 Interlocks. Various equipment designs require different approaches to the use of interlocks. These shall fall in one or more of the following categories and shall be consistent with equipment or system specifications. Interlock switches, as referred to herein, shall be the types described in 7.1.

(a) No interlocks required on major unit: When compartments are provided with doors, covers, or plates where access into the compartment is required for adjustment purposes in the normal operation of the equipment, no interlocks on the major unit shall be required provided voltages in excess of 70 volts rms are protected with barriers or guards to prevent personnel from accidental contact. Holes in the barrier may be utilized for testing purposes. Assemblies operating at potentials in excess of 500 volts rms and dc shall be completely enclosed from the remainder of the assembly when located in the equipment in which they are to be operated; such enclosures shall be separately interlocked. (Examples of units in this category are computers, control units, and consoles which may have a small separate high voltage supply for a cathode ray tube which shall be interlocked.)

(b) Interlocks required on major units with bypass devices: When compartments are provided with doors, covers, or plates where access into the compartment is required for adjustment purposes in the normal operation of the equipment, the doors, covers, or plates shall be equipped with interlocks with bypass devices that remove all potential in excess of 70 volts rms (see 7.1). This requirement shall also apply to associated capacitor circuits unless they discharge to 30 volts within 2 seconds or less. If this is impractical, such as in transmitters, modulators, etc., a grounding rod shall be provided. All contacts, terminals, and like devices having potentials between 70 and 500 volts rms and dc shall have barriers or guards provided to prevent personnel from accidental contact. Assemblies operating at voltage potentials exceeding 500 volts rms and dc shall be completely enclosed.

(c) Interlocks required on major units with no bypass devices permitted (over 500 volts rms and dc): When compartments are provided with doors, covers, or plates where access into the compartment is required for maintenance purposes, these doors, covers, or plates shall be equipped with interlocks, with no bypass devices, that remove all voltage potential in excess of 70 volts rms (see 7.1). This requirement shall also apply to associated capacitor circuits unless they discharge to 30 volts within 2 seconds or less. If this is impractical, such as in transmitters, modulators, etc., a grounding rod shall be provided. (This type of unit is normally a charging unit, transmitter, modulator, or intermediate power amplifier (IPA)).

5.7 Grounding rods. Grounding rods of sufficient size to permit storage of the rod within the equipment shall be provided in all transmitting equipment where voltages are in excess of 70 volts rms. A grounding stud shall be provided in all other transmitting equipment to permit attachment of a portable grounding rod. The permanently attached rod shall be connected through a flexible stranded copper wire (covered with a transparent sleeving) to the stud provided at the transmitter main frame. The connection to the stud shall be such that accidental loosening or high resistance to ground shall be prevented. In all other transmitters where only the stud is provided, a hand-operable quick-disconnect nut shall be provided to permit attachment of a portable ground rod.

5.8 Warning markings. All contacts, terminals, and like devices having potentials in excess of 500 volt rms and dc shall be clearly marked "DANGER HIGH VOLTAGE (MAXIMUM VOLTAGE APPLICABLE) VOLTS." The letters on the marking shall be Gothic capitals, clearly legible, color white or aluminum with red background (USAS Z35.1 - 1959). The markings shall be as permanent as normal life expectancy of the equipment on which it is affixed, and shall be permanently placed as close as possible to the point of danger. This shall be on a unit terminated basis and is not intended to apply to individual tie points within a unit.

5.9 Meter safety. Unless otherwise specified in the equipment specification, meters shall have provision for overload bypass or alternate protection to eliminate high voltage potential or current at the terminals in the event of meter failure.

5.10. High voltage protection. When the operation or maintenance of equipment employing potentials in excess of 1,000 volts peak could require that these voltages be measured, the equipment shall be provided with test points so that all high voltages can be measured at relatively low potential level, but in no case shall the potential exceed 1,000 volts peak relative to ground. This may be accomplished through the application of voltage dividers or other techniques, such as the use of safety-type panel meters and

multipliers. Full details shall be given in the instruction book or maintenance manual as to the method used in the equipment to obtain the voltages at the test points.

5.11 Discharging devices. Discharging devices shall be provided to discharge high voltage circuits and capacitors unless they discharge to 30 volts within 2 seconds or less. These protective devices shall be positive acting, highly reliable, and shall actuate automatically when the case or rack is opened. Shorting bars should be actuated either by mechanical release or by an electrical solenoid when the door or cover is open.

5.12 Connections for external power. Application of power to externally powered test equipment shall meet the following requirements:

(a) Power shall be controlled by a power ON-OFF switch located on the front panel. An indicator lamp shall be provided to indicate "power on" to the test set, except for low-power dry-battery-operated equipment.

(b) Neither side of the supply voltage shall be directly connected to the chassis.

5.13 Connectors, electrical. Connectors used to provide separation of or connection to multiple electric circuits shall be selected so that it will be impossible to insert the wrong plug in a receptacle or other mating unit. Where design considerations require plug and receptacles of similar configuration in close proximity, the mating plugs and receptacles shall be suitably coded or marked to clearly indicate the mating connections.

6. Microwave and X-radiation limits. Radiation limits for microwave and X-radiation generated by electronic equipment or other individual components, parts, data, markings, and guides for permissible levels of exposure to X-radiation shall be in accordance with MIL-R-9673.

6.1 Marking of radioactive material. The marking or labeling of commodities containing intentionally added radioactive materials shall conform to MIL-M-19590. Packages and containers shall be marked in accordance with MIL-STD-129.

7. Switches.

7.1 Interlocks. Unless otherwise specified, interlock switches shall conform to one or more of the following:

TABLE 1-II. Suitable internal protective measures 1/

Type of protection / Voltage range	None 2/	Guards and barriers	Enclosures	Marking		Interlocks		Discharge devices		Step-down devices (voltage measurement)
				Voltage	Warning	With bypass	No bypass 3/	Automatic	Ground rods	
See paragraph	5 5.6	5.5	5.6	5.5	5.8	5.6(b)	5.6(c)	5.11	5.7	5.10
0 - 30 Volts	X									
30+ - 70 Volts	X							X		
70+ - 500 Volts		X		X		X		X	X	
500+ - 1000 Volts			X		X	X	X	X	X	
1000+ Volts up			X		X	X	X	X	X	X

1/ Confine the application of headings to voltage ranges checked. However, more than one option may be available based on design requirements.

2/ Although no specific requirements exist for servicing from 0 - 70 volts, designs should be reviewed for possible hazard in accordance with Table 1-I.

3/ Designs may use "No bypass" interlock applications below 500 volts; but the intent here is to imply complete enclosure.

(a) A two-piece type in which the electrical circuit is broken by the physical separation of the two parts.

(b) A two-piece type in which the electrical circuit is broken by the physical separation of the two parts together with an associated electrically integral bypass device. This bypass switch or device shall be of a manually operated type, and shall be such that returning the chassis to the door, cover, or plate will automatically open the bypass switch and leave the interlock in position to function normally. Visual means shall be provided to indicate when the interlock switch is bypassed.

(c) One-piece switch assembly with an integral bypass device. This shall operate so that returning the chassis to the operating position or closing the door, cover, or plate will automatically leave the interlock in position to function properly. Visual means shall be provided to indicate when the interlock switch is bypassed.

7.2 Battle short.

(a) When required by the individual equipment specification, a battle short switch shall be provided on the main operating console or assembly to shortcircuit all safety interlocks. An indicator light readily visible to personnel shall indicate that the battle short switch is ON. The battle short switch shall also illuminate all interlock indicator lights.

(b) If specified in the individual equipment specification, terminals shall be provided in each separate cabinet or console for connecting or external battle short switch or switches.

7.3 Safety. Safety switches which will deactivate associated mechanical drive units shall be provided for the purpose of disconnecting these units without disconnecting other parts of the equipment. All remotely located assemblies shall have provision for safety switches to allow independent disconnect in the associated equipment.

7.4 Momentary override. When circuit considerations require noninterruption of power for efficient servicing, front panel momentary contact switches may be used to override interlocks and permit access to the manual override. The override switch shall be automatically disengaged when the protected access door or panel is replaced, but power to the equipment shall not be interrupted either when the override switch is being activated or disengaged.

8. Mechanical. The design of the equipment shall be such as to provide maximum convenience and safety to personnel while installing, operating, and maintaining the equipment. Suitable protection shall be provided to prevent contact with moving mechanical parts such as gears, fans, and belts when the equipment is complete and operating. Sharp projections on cabinets,

doors, and similar parts shall be avoided. Doors or hinged covers shall be rounded at the corners and provided with stops to hold them open. Equipment design shall include provisions to prevent accidental pulling out of drawers or rack-mounted equipment components which could cause equipment damage and injury to personnel. Equipment power switches shall be so designed and located that accidental contact by personnel will not place equipment in operation.

8.1 Mechanical interconnection. The design shall provide positive means to prevent the inadvertent reversing or mismating of fittings, couplings, fuel, oil, hydraulic, and pneumatic lines; mechanical linkage; and instrument leads and electrical connections. When prevention by design considerations of mismating is not feasible, coding or marking shall be employed.

8.2 Cathode ray tubes. Provision shall be incorporated to protect personnel from injury due to implosion of cathode ray tubes.

8.3 Glass fibers. Glass fibers materials shall not be used as the outer covering on cables, wire, or other components where they may cuase skin irritations to operating or maintenance personnel or where there is any evidence of glass fibers protruding from the surface.

8.4 Toxic materials. The materials, as installed in the equipment and under service conditions specified in the specific equipment specification, shall not liberate gases which combine with the atmosphere to form an acid or corrosive alkali, nor shall they liberate toxic or corrosive fumes which would be detrimental to the performance of the equipment or health of the equipment operators.

8.5 Insulation of controls. All control shafts and bushings thereof shall be grounded whenever practicable, alternatively, the control knobs or levers shall be insulated from the shaft to prevent electrical shock or burns caused by the possible existence of high voltage or voltages induced by stray high-frequency fields.

8.6 Temperature. Where people are involved, and under any condition of operation, exposed parts, including the enclosure of the equipment shall not achieve a temperature in excess of 60°C at an ambient temperature of 25°C. The temperature of front panels and operating controls shall not exceed 43°C at the same ambient temperature.

American National Standard

for leakage current for appliances

C101.1-1971

Contents

American National Standard for Leakage Current for Appliances

1. Scope

This standard is intended to provide maximum limits for appliance leakage current to which users may be exposed in normal use of the appliance. Supplementary information for specific appliances, including conditioning for tests, will appear in individual product standards.

2. Limitations

This standard is limited to use with household and similar appliances having two-wire or three-wire (including grounding conductor) flexible cord connection and rated for use on 120-volt single-phase circuits.

3. Leakage Current

When measured in accordance with the test method covered in this standard, the leakage current shall not exceed the values shown in Table 1.

Table 1
Maximum Leakage Current

Type of Appliance (Rated for use on 120 V circuits)	Maximum Leakage Current (mA)
Two-wire cord-connected appliance	0.50
Three-wire (including grounding conductor) cord-connected, portable appliance	0.50
Three-wire (including grounding conductor) cord-connected appliance (other than portable) with standard (complying with American National Standards C73.11-1966 or C73.12-1966) attachment plug cap rated 120 V, 20 A or less	0.75

NOTE: Appliances having a loss-of-ground detector which dependably opens the live conductor are exempted from the requirements of this Table.

4. Test Method and Instrumentation for Measurement of Leakage Current

4.1 General. This test is to provide a measurement of leakage current of ac appliances normally rated for use on nominally rated 120-volt single-phase circuits.

4.2 Characteristics Required of Measuring Circuit

4.2.1 Meter: Average responding, calibrated at 60 Hz (c/s) and indicating rms value of a pure sine wave. If dc component is present, use meter which also responds to dc.

4.2.1.1 Maximum error: The limits of error of the measuring instrument shall not exceed ±5 percent at an indication of 0.5 milliampere or at an indication of 0.75 milliampere.

NOTE: The meter may be an electronic or a direct indicating type meter.

4.2.2 Meter terminal impedance at 0.5 milliampere: 1500 ohms noninductive resistance shunted by an 0.15 μF capacitance.

NOTE: Frequency response of circuit of meter terminal impedance approximates the experimentally determined 50 percentile threshold of perception curve for hand holding a small wire.[1]

4.3 Conditions of Test (see Fig. 1)

4.3.1 Appliance is to be tested as received at room temperature, in "ON" position with switch "S_1" open.

4.3.2 Appliance is to be tested at room temperature in the "ON" position within five seconds after energizing (switch "S_1" closed) and again after reaching thermal equilibrium.

4.3.3 Appliances with speed controls are to be tested in a low, medium, and high speed position.

NOTE: It is anticipated the production tests will be made with the control in the position that results in maximum leakage current on the type test.

[1] References:

DALZIEL, C. F. and MANSFIELD, T. H. Effect of frequency on perception currents. *AIEE Transactions*, part II, vol 69, 1950, fig. 4.

DALZIEL, C. F. Effects of electric shock on man. *IRE Transactions on Medical Electronics*, PGM-5, July 1956, fig. 7.

4.3.4 Motor-operated appliances are to be tested under "no load" conditions.

4.3.5 Heating and cooking appliances are to be operated at maximum heat setting of controls.

4.4 Test Equipment

4.4.1 Leakage current test circuit as shown in Fig. 1 will be used.

4.4.2 Meter as outlined in 4.2.1 will be used.

4.5 Test Procedure

4.5.1 Connect meter for test in position of Fig. 1.

4.5.2 Connect all simultaneously accessible exposed conductive surfaces of appliance together and connect through meter to neutral conductor.

NOTE 1: Leakage current between conductive surfaces may require consideration with some products, for example, electronic equipment.

NOTE 2: The design of a specific type of appliance might call for a modification of this test method in the product standard.

4.5.3 With switch "S_1" open, adjust input voltage to 120 volts ac.

4.5.4 Test appliance as received connected to one side of the line, switch "S_1" open, all appliance switches "ON."

4.5.4.1 With switch "S_2" in the "A" position, note meter reading.

4.5.4.2 Repeat 4.5.4.1 with switch "S_2" in the "B" position.

4.5.5 Test appliance as received, connected to both sides of the line, switch "S_1" closed, all appliance switches "ON," and input voltage adjusted to 120 volts ac.

Repeat 4.5.4.1 and 4.5.4.2 within five seconds after appliance is turned "ON." In the case of an appliance with more than one speed, repeat for a low, medium, and high speed.

4.5.6 Test appliance after thermal stabilization.

Operate appliance until thermal stabilization is reached and repeat per 4.5.5.

NOTE: Motor-operated appliances are to be operated at "no load" conditions. Heating and cooking appliances are to be operated at maximum heat setting of controls, unless otherwise specified in a separate standard for the appliance.

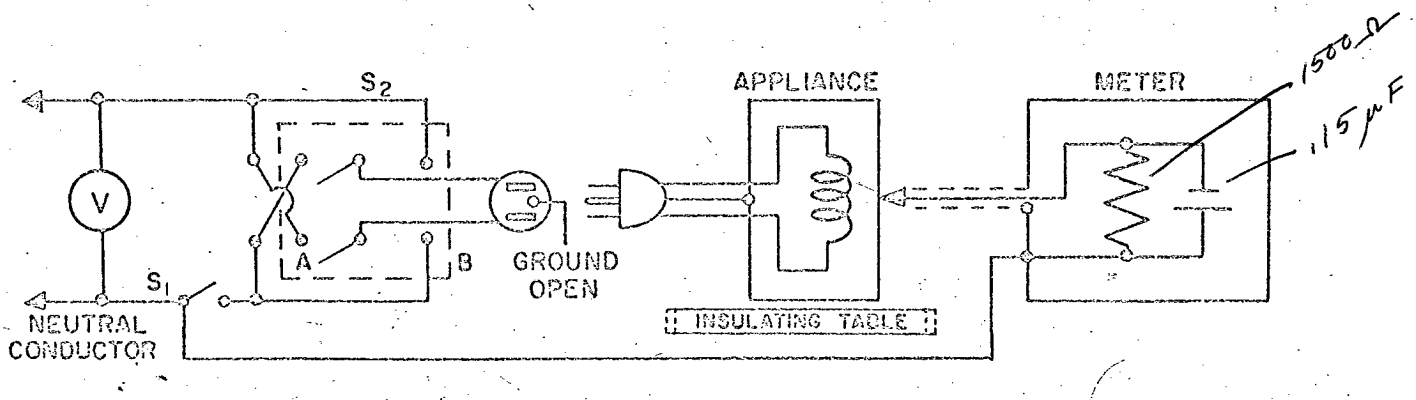
5. Revision of American National Standards Referred to in This Document

When the following standards referred to in this document are superseded by a revision approved by the American National Standards Institute, the revision shall apply:

American National Standard Dimensions of Plugs and Receptacles—General Purpose: 125 Volts, 15 Amperes, 2 Pole, 3 Wire, Grounding Type, C73.11-1966

American National Standard Dimensions of Plugs and Receptacles—General Purpose: 125 Volts, 20 Amperes, 2 Pole, 3 Wire, Grounding Type, C73.12-1966

Fig. 1
Circuit for Leakage Current Test



American National Standards

The standard in this booklet is one of nearly 4,000 standards approved to date by the American National Standards Institute, formerly the USA Standards Institute.

The Standards Institute provides the machinery for creating voluntary standards. It serves to eliminate duplication of standards activities and to weld conflicting standards into single, nationally accepted standards under the designation "American National Standards."

Each standard represents general agreement among maker, seller, and user groups as to the best current practice with regard to some specific problem. Thus the completed standards cut across the whole fabric of production, distribution, and consumption of goods and services. American National Standards, by reason of Institute procedures, reflect a national consensus of manufacturers, consumers, and scientific, technical, and professional organizations, and governmental agencies. The completed standards are used widely by industry and commerce and often by municipal, state, and federal governments.

The Standards Institute, under whose auspices this work is being done, is the United States clearinghouse and coordinating body for standards activity on the national level. It is a federation of trade associations, technical societies, professional groups, and consumer organizations. Some 1,000 companies are affiliated with the Institute as company members.

The American National Standards Institute is the United States member of the International Organization for Standardization (ISO), the International Electrotechnical Commission (IEC), and the Pan American Standards Commission (COPANT). Through these channels American industry makes its position felt on the international level. American National Standards are on file in the libraries of the national standards bodies of more than 50 countries.

For a free list of all American National Standards, write:

American National Standards Institute, Inc

1430 Broadway New York, N. Y. 10018

CONTRACT INSPECTION REPORT

CONTRACT NO. [redacted] TASK NO. 18 25X1

TO:

CONTRACT ADMINISTRATION & SETTLEMENT
BRANCH/PD/OL

DATE: 11 January 1968

INSPECTION REPORT NO. *(If final, so state)*: Final

ESTIMATED COMPLETION DATE: 27 October 1967

NAME OF CONTRACTOR: [redacted] 25X1

TYPE OF COMMODITY OR SERVICE: Analog Image Restoration Contract

THE CONTRACTOR IS ON SCHEDULE ☒ YES ☐ NO

PER CENT OF WORK COMPLETED - 100%

PER CENT OF FUNDS EXPENDED - 100%

THE CONTRACTOR WILL PROBABLY REMAIN WITHIN ALLOCATED FUNDS ☒ YES ☐ NO IF ANSWER IS "NO" ADVISE RECOMMENDATION AND/OR ACTION OF SPONSORING OFFICE, ON REVERSE HEREOF. IF KNOWN, INDICATE MAGNITUDE OF ADDITIONAL FUNDS INVOLVED.

HAS AN INTERIM REPORT, FINAL REPORT, PROTOTYPE, OR OTHER END ITEM BEEN RECEIVED FROM THE CONTRACTOR DURING THE PERIOD? ☒ YES ☐ NO *(If yes, give details on reverse side.)*

HAS GOVERNMENT-OWNED PROPERTY BEEN DELIVERED TO CONTRACTOR DURING THIS PERIOD? ☐ YES ☒ NO *(If yes, indicate items, quantity, and cost on reverse side.)*

INCENTIVES

IS THIS AN INCENTIVE CONTRACT ☒ YES ☐ NO

IF YES, CHECK TYPE

☐ COST ☐ AWARD FEE ☒ PERFORMANCE ☐ DELIVERY

NOTE:
USE REVERSE SIDE FOR COMMENTS.
FINAL REPORT MUST CONTAIN INCENTIVE EVALUATION.

OVERALL PERFORMANCE OF CONTRACTOR

1. ☐ OUTSTANDING
2. ☒ EXCELLENT
3. ☐ VERY GOOD
4. ☐ ABOVE AVERAGE
5. ☐ AVERAGE
6. ☐ MINIMUM ACCEPTABLE
7. ☐ UNSATISFACTORY

IF OVERALL PERFORMANCE OF CONTRACTOR IS UNSATISFACTORY OR MINIMUM ACCEPTABLE INDICATE REASONS ON REVERSE SIDE.

RECOMMENDED ACTION

☐ CONTINUE AS PROGRAMMED

☐ WITHHOLD PAYMENT PENDING SATISFACTORY PERFORMANCE

☒ TERMINATE

☐ OTHER *(Specify)*

IF TERMINATION IS RECOMMENDED OR IF THIS IS A FINAL REPORT PUT COMMENTS ON REVERSE IN NARRATIVE FORM ON CONTRACTOR'S PERFORMANCE AND CERTIFY THAT ALL DELIVERABLE ITEMS UNDER THE CONTRACT HAVE BEEN RECEIVED. THESE INCLUDE, WHERE APPLICABLE, THE FOLLOWING:

ITEM	REC'D	DOES NOT APPLY	ITEM	REC'D	DOES NOT APPLY
PROTOTYPES			MANUALS		
DRAWINGS AND SPECIFICATIONS			FINAL REPORT	X	
PRODUCTION AND/OR OTHER END ITEMS			SPECIAL TOOLING		
			OTHER GOVERNMENT PROPERTY		

DATE OF LAST CONTACT WITH CONTRACTOR: 4 January 1968

SIGNATURE OF INSPECTOR: [redacted]

DIVISION: TDS/EDL 25X1

INSPECTOR'S EXTENSION: [redacted]

SIGNATURE OF APPROVER: [redacted] 25X1

FORM 8-66 1897 USE PREVIOUS EDITION ☐ UNCLASSIFIED ☐ CONFIDENTIAL ☒ SECRET (12-36)

NARRATIVE REPORT	☐ INTERIM	☒ FINAL

The final report was received on 4 December 1967.